Forecast of future geomagnetic storm strength: 5 years online

Tatiana Podladchikova (1) and Anatoly Petrukovich (2)

(1) Skolkovo Institute of Science and Technology, Moscow, Russian Federation (t.podladchikova@skoltech.ru), (2) Space Research Institute, Moscow, Russian Federation (apetruko@iki.rssi.ru)

Using L1 solar wind and IMF measurements we forecast expected strength of geomagnetic storm several hours ahead. Storm Dst magnitude can be well predicted, while exact time profile of the index and moment of minimal Dst remain uncertain. The forecast was implemented online in 2011 (http://spaceweather.ru). In this poster we review performance of the algorithm during more than 5 years of operation. This solar maximum is rather weak, so the most of statistics are rather moderate storms. We verify quality of selection criteria, as well as reliability of online input data in comparison with the final values, available in archives.